

DOCKET NO. D-2012-021 CP-1

DELAWARE RIVER BASIN COMMISSION

**Southeastern Pennsylvania
Ground Water Protected Area**

**Bucks County Water & Sewer Authority
Water Supply Interconnection Project**

**Hulmeville Borough, Langhorne Borough, Langhorne Manor Borough, Lower
Southampton Township, Middletown Township, Pennel Borough, Bensalem Township,
Northampton Township, Upper Southampton Township, Falls Township, Newtown
Borough, Newtown Township, Lower Makefield Township, and Bristol Township, Bucks
County and Lower Moreland Township Montgomery County, Pennsylvania**

PROCEEDINGS

This docket is issued in response to an Application submitted by Gilmore and Associates, Inc. on behalf of Bucks County Water & Sewer Authority (BCWSA) to the Delaware River Basin Commission (DRBC or Commission) on August 7, 2012 (Application), for an approval of a subsidiary water allocation interconnection project in the Ground Water Protected Area of Southeastern Pennsylvania. The Subsidiary Water Allocation Permit was reviewed under the Pennsylvania Safe Drinking Water Act and approved by the Pennsylvania Department of Environmental Protection (PADEP) in correspondence dated August 22, 2012 to BCWSA (Permit No. WA-09-1005).

The application was reviewed for inclusion of the project in the Comprehensive Plan and approval under Section 3.8 and for a withdrawal permit under Section 10.3 of the *Delaware River Basin Compact*. The Bucks and Montgomery County Planning Commissions have been notified of pending action on this docket. A public hearing on this project was held by the DRBC on December 5, 2012.

A. DESCRIPTION

1. Purpose. The purpose of this docket is to approve a water subsidiary water allocation for BCWSA of up to 10.0 million gallons per day (mgd) of potable water through a new interconnection with North Wales Water Authority (NWWA). The water will be supplied from the Forest Park Water Treatment Facility (FPWTF) (Docket Numbers D-1965-076 CP-8 and D-1965-076 CP-9), which is jointly owned by the NWWA and North Penn Water Authority

(NPWA). The water will be used by the docket holder to serve its customers in Lower Bucks and Montgomery Counties, Pennsylvania.

2. Location. The project interconnection with NWWA from FPWTF is to be located at the intersection of County Line Road and Valley Road on the border of Warminster and Warrington Townships in Bucks County and Horsham Township in Montgomery County, Pennsylvania. Potable water from the FPWTF, which is located in Chalfont, Bucks County will be transported through water mains to the new BCWSA water main along County Line Road to the Feasterville Water Tank.

Specific location information has been withheld for security reasons.

3. Area Served. BCSWA's service area is the portion of Lower Bucks County which is bound by the Delaware River to the south, the Poquessing Creek and City of Philadelphia to the west, Warminster and Warwick Townships to the north and the Neshaminy Creek and Middletown Township to the east. The docket holder serves the following municipalities: Hulmeville Borough, Langhorne Borough, Langhorne Manor Borough, Lower Southampton Township, Middletown Township, Pennel Borough, Bensalem Township, Northampton Township, Upper Southampton Township, Falls Township, Newtown Borough, Newtown Township, Lower Makefield Township, and Bristol Township, Bucks County and Lower Moreland Township Montgomery County, Pennsylvania as indicated on the map submitted with the application.

4. Physical features.

a. Design criteria. The BCWSA system currently serves an estimated population of 186,045 through 14,377 service connections, plus an additional 1,356 commercial connections, 61 industrial connections and 80 institutional connections. The docket holder has a current average water demand of 15.56 mgd and a peak demand of 20.0 mgd. BCSWA will no longer provide water to Aqua PA (estimated 7.0 mgd). The docket holder projects an average water demand of 12.5 mgd by the year 2022. The 2022 projected average demand does not include purchases of water from Aqua PA. The sources of water for this water service in 2022 will be the County Line Road and North Wales connection, and the interconnection with Lower Bucks County Joint Municipal Authority.

b. Facilities. The project interconnection with NWWA from the FPWTF will be located at the intersection of County Line Road and Valley Road on the border of Warminster and Warrington Townships in Bucks County and Horsham Township in Montgomery County, Pennsylvania. From the Intersection of County Line Road and Valley Road, the BCWSA will construct a 30-inch water transmission main that leads to a water tank owned by BCWSA in Feasterville, Bucks County. This will consist of approximately 50,000 linear feet (LF) of 30-inch water main along County Line Road in both Bucks and Montgomery Counties. A meter chamber will be installed at the County Line Road and Valley Road intersection, which will serve as the point of water purchase for BCWSA.

The BCWSA presently serves portions of Lower Bucks County, which is referred to as the Southwest Region Water System (SRWS). The BCWSA currently purchases water from the City of Philadelphia's Water Department's (PWD) to serve the SRWS. The water is treated at PWD's Samuel S. Baxter Water Treatment Plant on State Road in the Torresdale section of Philadelphia. The water is transmitted to the SRWS by means of a 7 mile long transmission main owned by the BCWSA. The water main is 48-inch at PWD's water distribution system at Grant Avenue and State Road in the City of Philadelphia and reduces in size to 42-inch, and to a 30-inch pipe prior to terminating in Middletown Township.. From this point, the pipeline alignment is northerly along State Road, crossing into Bensalem Township in Bucks County to Bridgewater Road. It then traverses Bridgewater Road in a northwesterly direction, crossing beneath Interstate 95, thence onto Bensalem Boulevard. The pipeline follows Bensalem Boulevard in a northerly direction to Gibson Road. It then follows Gibson Road in a northwesterly direction to Pasqualone Boulevard in a northwesterly direction. It terminates at Route 1 in Middletown Township, Bucks County where it connects to the BCSWA water distribution system. BCSWA has sold a section of the transmission line to Aqua PA.

All water service connections are metered.

The project facilities are above the 100-year flood elevation.

The BCWSA distribution system has interconnections with Lower Bucks County Joint Municipal Authority, Aqua PA (Montgomery County), Falls Township, Aqua PA (Bensalem), Upper Southampton Municipal Authority, Northampton Township Municipal Authority, Newtown Artesian Water Company, Borough of Hulmeville and PWD. All of the connections are presently used regularly; after the interconnection with the NWWA is completed the interconnection with the PWD, BCWSA may make arrangements with PWD to supply water on an emergency basis.

System storage facilities have the following capacities:

LOCATION	CAPACITY (MG)
Siles Tank #1 – Lower Southampton Township	2.0
Siles Tank #2 – Lower Southampton Township	2.0
Middletown Tank #1 – Middletown Township	3.5
Middletown Tank #2 – Middletown Township	2.0
Oxford Valley Tank	2.0
Feasterville Tank	2.0
TOTAL:	13.50

c. **Water Withdrawals.** The potable water will be supplied from the (FPWTF which received approval most recently under Section 3.8 of the Compact by DRBC Docket Nos. D-1965-076-CP-8 on February 18, 1981 and D-1965-076 CP-9 on March 16, 2005.

Docket No. D-1965-076 CP-8 describes revisions to the Neshaminy Watershed Plan and approved the surface water withdrawals and related facilities for the FPWTF, including a reduction in capacity of the water treatment plant, previously approved in Docket No. D-1970-

242. . Docket No. D-1965-076 CP-8 approved the initial design capacity of the FPWTF at 20 mgd with a planned future expansion to 40 mgd by the year 2010. Docket No. D-1965-076 CP-9 approved on March 16, 2005, approved the expansion of the FPWTF to 40 mgd. The docket also included allocations of water allowed to be withdrawn from the Delaware River Point Pleasant Pumping Station (maximum of 48.8 mgd for use by the NWRA (now owned by Forest Park Water) and up to 46.2 mgd for use by PECO (now owned by Exelon). Additionally, the docket required the docket holder to maintain a minimum flow of 5.3 mgd from March 1 to June 15, and a minimum of 2.73 mgd the remainder of the year, in North Branch Neshaminy Creek, as measured at the Forest Park intakes. After accounting for augmentation and evaporative and seepage losses, up to 39.5 mgd of the water withdrawn from the Delaware River for water supply purposes would be available for use at the FPWTF.

d. **Other.** Wastewater is conveyed to the PWD's Philadelphia Northeast Wastewater Treatment facility which received approval most recently under Section 3.8 of the Compact by DRBC Docket No. D-1970-052 CP on July 26, 1972. The PADEP issued its most recent NPDES Permit No. PA0026689 on August 15, 2007 for this treatment facility. PWD submitted an application to PADEP on April 2, 2012. The application is under review by PADEP. Wastewater is also conveyed to the Lower Bucks County Joint Municipal Authority sewage treatment plant which received approval most recently under Section 3.8 of the Compact by DRBC Docket No. D-1993-068 CP on March 23, 1994. The PADEP issued its most recent NPDES Permit No. PA0026468 on September 25, 2007 and was then later amended on January 28, 2011 for this treatment facility.

e. **Construction Cost.** The overall cost of this project is estimated to be \$19,213,000.

f. **Relationship to the Comprehensive Plan.** Upon approval of this docket, this project is incorporated into the Comprehensive Plan.

B. FINDINGS

The NWWA and NPWA have entered into a Water Purchase Agreement (Agreement) with the BCSWA, dated December 21, 2010, in which NWWA and NPWA agree to each make 5.0 mgd of capacity available to the BCWSA on an annual basis for a total of 10.0 mgd. Commission approval this subsidiary allocation is restricted to the 10 mgd being contracted and does not approve or commit the Commission to approve any potential future need to expand the treatment capacity of the FPWTF or the Point Pleasant Pumping Station water withdrawal allocation from the Delaware River (D-1965-076 CP-8). Commission judgment on any such projects will be made only after the referenced docket holders of such projects conclude that such expansions are necessary, submit an application(s) and supporting materials, and the Commission reviews the applications and completes its public process.

The project is located within the Southeastern Pennsylvania Ground Water Protected Area delineated by the DRBC pursuant to Compact Section 10.2. The project is designed to conform to the requirements of the *Water Code, Water Quality Regulations and Ground Water*

Protected Area Regulations (GWPAR) of the DRBC. The project does not involve groundwater within the *GWPAR*. Review and analysis of the application pursuant to Section 6.D. of the *GWPAR* result in the following:

Water Audits for Public Water Supply Systems Serving Greater than 100,000 gpd

Section 2.1.8 of the Water Code states that it is the policy of the Commission to establish a standardized water audit methodology for owners of water supply systems serving the public to ensure accountability in the management of water resources. Voluntary Water Audits were encouraged for public water supply systems through December 31, 2011 (Section 2.1.8.B.). Effective January 1, 2012, the owners of each public water supply system are required to implement an annual calendar year water audit program conforming to IWA/AWWA Water Audit Methodology (AWWA Water Loss Control Committee (WLCC) Water Audit Software) and corresponding AWWA guidance (Section 2.1.8.C). The results of the first annual water audit shall be submitted to the Commission by March 31, 2013. Subsequent annual water audits shall be submitted annually to the Commission by March 31 every year thereafter.

The project does not conflict with the Comprehensive Plan, and is designed to prevent substantial adverse impact to the water resources related environment, while sustaining the current and future water uses and development of the water resources of the Basin.

The BCWSA estimates that the project withdrawals, used for the purpose of public water supply, result in a consumptive use of 10 percent of the total water use. The DRBC definition of consumptive use is defined in Article 5.5.1.D. of the *Administrative Manual – Part III – Basin Regulations – Water Supply Charges*.

C. DECISION

I. Effective on the approval date for Docket No. D-2012-021 CP-1 below:

a. The project and the appurtenant facilities described in the Section A “Physical Features” of this docket shall be added to the Comprehensive Plan.

II. The project as described in the Section A “Physical features” is approved pursuant to Section 3.8 of the *Compact* and is granted this withdrawal permit pursuant to Section 10.3 of the *Compact* and *GWPAR*, subject to the following conditions:

a. Docket approval is subject to all conditions, requirements, and limitations imposed by the PADEP, and such conditions, requirements, and limitations are incorporated herein, unless they are less stringent than the Commission’s. Within 60 days (February 5, 2013), the docket holder shall provide written confirmation to the Commission that it has registered and reported with PADEP all surface and groundwater sources described in this docket in accordance with the Pennsylvania Regulations (Title 25 - Environmental Protection, [25 PA. CODE CH. 110], Water Resources Planning).

b. The operational records shall be available at all times for inspection by the DRBC.

c. The project interconnection shall be operated at all times to comply with the requirements of the *Water Code* and *Water Quality Regulations* of the DRBC.

d. During any day period, the total potable water transfers shall not exceed 10.0 mgd and the total monthly transfer shall not exceed 310.0 mgm

e. The project interconnections shall be metered with an automatic continuous recording device that measures to within 5 percent of actual flow. An exception to the 5 percent performance standard, but no greater than 10 percent, may be granted if maintenance of the 5 percent performance is not technically feasible or economically practicable. A record of daily withdrawals shall be maintained, and monthly totals shall be reported annually by March 31, to the Bureau of Watershed Management, PADEP. Withdrawal records shall be available at any time to the Commission if requested by the Executive Director.

f. Each new water service connection shall include a water meter in accordance with the DRBC's Resolution No. 87-7 (Revised).

g. The docket holder shall continue to implement its Water Conservation Plan as approved by PADEP, and shall report to the PADEP on the actions taken pursuant to this program and the impact of those actions as requested by the PADEP.

h. No water service connections shall be made to newly constructed premises with plumbing fixtures and fittings that do not comply with water conservation performance standards contained in Resolution No. 88-2 (Revision 2).

i. The docket holder shall implement to the satisfaction of the Bureau of Watershed Management, PADEP, a drought or other water supply emergency plan.

j. In accordance with DRBC Resolutions No. 87-6 (Revised) and No. 2009-1, the docket holder shall continue to implement to the satisfaction of the Bureau of Watershed Management and the PADEP, the systematic program to monitor and control leakage within the water supply system. The program shall at a minimum include: periodic surveys to monitor leakage, enumerate non-revenue water and determine the current status of system infrastructure; recommendations to monitor and control leakage; and a schedule for the implementation of such recommendations. The docket holder shall proceed expeditiously to correct leakages and unnecessary usage identified by the program.

k. In accordance with DRBC Resolution No. 2009-1 and Section 2.1.8 of the Water Code, the docket holder shall implement an annual calendar year water audit program conforming to IWA/AWWA Water Audit Methodology (AWWA Water Loss Control Committee (WLCC) Water Audit Software) and corresponding guidance. The results of the first annual water audit shall be submitted to the Commission by March 31, 2013. Subsequent annual water audits shall be submitted annually to the Commission by March 31 every year thereafter.

l. Within three years of docket approval, the docket holder shall submit a study of its current and projected ten year water demands and shall file a progress report thereon with the Commission and PADEP. This report will discuss whether the BCWSA will need

additional capacity and how such capacity is planned to be obtained, including any potential request to the FPWTF to move forward with an expansion of the water treatment plant and/or increase withdrawal from the Pt. Pleasant Pump Station water withdrawal. No design of any requested expansion at the FPWTF or the Pt. Pleasant Pumping Station shall be initiated without Commission approval.

m. The docket holder shall implement to the satisfaction of the Bureau of Watershed Management and PADEP, a continuous program to encourage water conservation in all types of use within the facilities served by this docket approval. The docket holder will report to the Bureau of Watershed Management, PADEP, on the actions taken pursuant to this program and the impact of those actions as requested by the PADEP.

n. This approval of the construction related to the interconnection as described in paragraph A.4.b of this docket shall expire three years from date below unless prior thereto the docket holder has commenced operation of the subject project or has provided the Executive Director with written notification that is has expended substantial funds (in relation to the cost of the project) in reliance upon this docket approval.

o. Sound practices of excavation, backfill and reseedling shall be followed to minimize erosion and deposition of sediment in streams.

p. Within 30 days of completion of construction of the approved project, the docket holder is to submit to the attention of the Project Review Section of DRBC a Construction Completion Statement (“Statement”) signed by the docket holder’s professional engineer for the project. The Statement must (a) either confirm that construction has been completed in a manner consistent with any and all DRBC-approved plans or explain how the as-built project deviates from such plans; (b) report the project’s final construction cost as such cost is defined by the project review fee schedule in effect at the time application was made; and (c) indicate the date on which the project was (or is to be) placed in operation. In the event that the final project cost exceeds the estimated cost used by the applicant to calculate the DRBC project review fee, the statement must also include (d) the amount of any outstanding balance owed for DRBC review. Such outstanding balance will equal the difference between the fee paid to the Commission and the fee calculated on the basis of the project’s final cost, using the formula and definition of “project cost” set forth in the DRBC’s project review fee schedule in effect at the time application was made. This docket approval shall expire three years from the date below unless prior thereto the docket holder has commenced operation of the subject project or has expended substantial funds (in relation to the cost of the project) in reliance upon this docket approval.

q. No new water service connections shall be made to premises connected to sewerage systems which are not in compliance with all applicable effluent limits contained in State permits and the *Water Quality Regulations* of the Commission.

r. Nothing herein shall be construed to exempt the docket holder from obtaining all necessary permits and/or approvals from other State, Federal or local government agencies having jurisdiction over this project.

s. The area served by this project is limited to the service area as described above. Any expansion beyond this area is subject to review in accordance with Section 3.8 of the *Compact* and the *GWPAR*.

t. Unless an extension is requested and approved by the Commission in advance, in accordance with paragraph 11 of the Commission's Project Review Fee schedule (Resolution No. 2009-2), the docket holder is responsible for timely submittal of a docket renewal application on the appropriate DRBC application form at least 12 months in advance of the docket expiration date set forth below. The docket holder will be subject to late charges in the event of untimely submittal of its renewal application, whether or not DRBC issues a reminder notice in advance of the deadline or the docket holder receives such notice. In the event that a timely and complete application for renewal has been submitted and the DRBC is unable, through no fault of the docket holder, to reissue the docket before the expiration date below (or the later date established by an extension that has been timely requested and approved), the terms and conditions of the current docket will remain fully effective and enforceable against the docket holder pending the grant or denial of the application for docket approval.

u. The issuance of this docket approval shall not create any private or proprietary rights in the water of the Basin, and the Commission reserves the right to amend, alter or rescind any actions taken hereunder in order to insure the proper control, use and management of the water resources of the Basin.

v. If any information demonstrates that the operation of this project significantly affects or interferes with any domestic or other existing wells or surface water supplies, or if the docket holder receives a complaint by any user of wells or surface water supplies within the zone of influence of the withdrawal, the docket holder shall immediately notify the Executive Director of any complaints by users of wells or surface water supplies within the zone of influence of the withdrawal, and unless excused by the Executive Director, shall investigate such complaints. Any well or surface water supply which is substantially adversely affected, or rendered dry or otherwise unusable as a result of the docket holder's project withdrawal, shall be repaired, replaced or otherwise mitigated at the expense of the docket holder in accordance with Section 10B of the *GWPAR*. A report of investigation and/or mitigation plan prepared by a hydrologist shall be submitted to the Executive Director as soon as practicable. The Executive Director shall make the final determination regarding the validity of such complaints, the scope or sufficiency of such investigations, and the extent of appropriate mitigation measures, if required. The Executive Director may modify or suspend this docket approval, or require mitigating measures, pending additional review.

w. The Executive Director may modify or suspend this approval or any condition thereof, or require mitigating measures pending additional review, if in the Executive Director's judgment such modification or suspension is required to protect the water resources of the Basin.

x. For the duration of any drought emergency declared by either Pennsylvania or the Commission, water service or use by the docket holder pursuant to this

approval shall be subject to the prohibition of those nonessential uses specified by the Governor of Pennsylvania, the Pennsylvania Emergency Management Council, PADEP, or the Commonwealth Drought Coordinator, to the extent that they may be applicable, and to any other emergency resolutions or orders adopted hereafter by the Commission.

y. Any person who objects to a docket decision by the Commission may request a hearing in accordance with Article 6 of the Rules of Practice and Procedure. In accordance with Section 15.1(p) of the Delaware River Basin Compact, cases and controversies arising under the Compact are reviewable in the United States district courts.

BY THE COMMISSION

APPROVAL DATE: December 5, 2012

EXPIRATION DATE: December 5, 2022